

Invited talks

Invited talks at international conferences and workshops

1. XXIX International School of Semiconductor Compounds, Jaszowiecz 2000, Pologne
2. Workshop on Microcavities, 26 mars 2001, Lausanne.
3. Workshop du RTN Photon Mediated Phenomena. Autrans (juin 2005)
4. Conférence OECS9 Southampton 5-10 septembre 2005
5. Quantum communication GDR workshop ,19 et 20 octobre 2005, Palaiseau
6. 11ème JNMO, Aussois 4-7 avril 2006, Couplage fort pour une boîte quantique en microcavité
7. International conference on Quantum Dots QD2006, Chamonix 1-5 mai 2006
8. Journée du pôle Nanophotonique et Information Quantique, Marcoussis, 18 mai 2006
9. ICPS, Vienna, Austria 23-28 juillet 2006
10. Third international workshop on quantum optics in semiconductor nanostructures. Wursburg-Rothenburg. 5-6 octobre 2006
11. Congrès national de la Société Française de Physique, Juillet 2009
12. Nano and Giga Challenges in Electronics, Photonics and Renewable Energy. 14th . Canadian Semiconductor Technology Conference. Hamilton, Ontario, Canada, August 10-14, 2009 (**Plenary talk**)
13. Quantum Dot day meeting, Grenoble, 19 juin 2009
14. International conference on the Optics of Excitons in Confined Systems OECS 11
15. Workshop Prominas, Grenoble, Septembre 2009
16. Workshop Quantum Information and Spintronics with Semiconductors, Quantum Information and Spintronics with Semiconductors , Toulouse du 11 au 13 octobre 2009.
17. Workshop franco-taïwanais, 15-17 decembre 2009, Taïwan
18. QD2010 Nottingham, 26-30 April 2010, Nottingham, UK,
19. NOEKS 10 - August 16-19, 2010 in Paderborn/Germany
20. JMC 12, Troie , août 2010.
21. 6th workshop RFW2010
22. SPIE Photonic West, San Francisco Janvier 2011
23. CLEO/IQEC 2011, Munich, Mai 2011
24. Spring Meeting of the German Physical Society, Dresden, 18 March 2011.
25. Summer School Nanosciences Ile de France. 19-24 Juin 2011.
26. NCCR metting, Switzerland, 5-6 Juillet 2011.
27. French-Japanese workshop organized by the Japanese Society for the Promotion of Science, Ecole Normale Supérieure de Cachan, 12-13 Décembre 2011
28. SPIE Conference on Quantum Sensing and Nanophotonic Devices IX, Photonic West, San Francisco, CA, 23-27 janvier 2012
29. 20th Int. Symposium « Nanostructures : Physics and Technology, Nizhny-Novgorod, Russie, 24-30 juin 2012
30. Spring Meeting of the German Physical Society, Berlin, 29 March 2012
31. Journées thématiques du GDR Ondes, Dijon 8-9 février 2012
32. 41st Jaszowiec International School and Conference on the Physics of Semiconductors, Poland
33. International Summer School "SPINOPTRONICS" (ISSO-2012), St. Petersburg, Russia, July 10-14, 2012

34. POLATOM, Cambridge, UK, 9 - 14 September 2012
35. 11th International Workshop on Nonlinear Optics and Excitation Kinetics in Semiconductors (NOEKS 11) Stuttgart, Germany, September 23 -27, 2012
36. Photonic West, San Francisco, 2-7 February 2013
37. Inauguration Day, Institut Néel, Grenoble, 10-11 April 2013,
38. NIM Winter school, Kirchberg, Austria, March 3-9,2013
39. ICSO workshop, Toulouse, France, 11-14 June 2013
40. CQO-QIM conference, Rochester NY, USA, June 17-20, 2013
41. UK Semiconductor, Sheffield, UK, July 3-5, 2013, (**Plenary talk**)
42. J3N Workshop, Marseilles, November 2013
43. CNRS-Ben Gourion, November 2013,
44. International workshop on Extreme light concentration, 6 Juin 2014 Palaiseau, France
45. CLEO San Jose, 10-15 June 2014,
46. 12th International Workshop on Nonlinear Optics and Excitation Kinetics in Semiconductors (NOEKS 12) Bremen, Germany, September 22-25, 2014
47. Workshop Technoparade, 18-19 september, 2014, Marcoussis, France
48. International workshop Polarys, POLARiton blockade effects in RYdberg atoms and Semiconductors, 2-4 december 2014, Palaiseau
49. Workshop Engineering the atom-photon interaction, Innsbruck, Austria, 4-5 december 2014
50. Photonic West 2-7 February 2015, San Francisc 2015
51. First Workshop for Quantum Repeaters and Networks, Asilomar, CA, May 15-17, 2015.
52. OSA Topical Meeting on Integrated Photonics Research (IPR 2015) 1-4 July 2015, Boston, US
53. Progress in Electromagnetic Research Symposium on Photonics, July 6-9, 2015 in Prague, Czech Republic
54. Conference on Resonator QED 2015 3-7 August 2015, Munich, Germany
55. Congrès général de la Société Française de Physique (**Plenary talk**) Strasbourg, August 2015
56. Optics of Excitons in Confined Systems Conference OECS14, Jerusalem, 11-16 October 2015
57. 3rd international workshop on Engineering of Quantum Emitter Properties, Linz, Austria, December 2015
58. 9th International Conference on Quantum Dots (QD 2016), Jeju, Korea from 22nd to 27th of May 2016.
59. Qcom Workshop, 19-20 May 2016, Bad Honnef
60. Congrès de la Société Française d'Optique, Bordeaux, July 4-7 th 2016, (**Plenary talk**)
61. 9th Italian Quantum Information Science Conference - IQIS 2016, Rome, Italy 20-23 September 2016 (**Tutorial**)
62. Frontiers in Optics/Laser Science FIO/LS Rochester, October 17-21, 2016
63. Quantum Optic 8, Sao Paulo State, Brazil , October 23-28, 2016
64. Alfred Kastler symposium, Paris, December 1st 2016
65. EQuS Workshop, Noosa Heads, Australia, December 8-10, 2016
66. Photonic West 28 Jan - 2 Feb 2017, San Francisco 2017
67. DPG Spring meeting, Dresden, Germany 21-24 March 2017 (**Plenary talk**)
68. 2017 Conference Quantum Fluids of Light and Matter.Cargèse (France) May 8 to May 12, 2017.
69. CLEO - San Jose - USA - 2017
70. ICOLS International CONference on Laser Spectroscopy. - Arcachon, France July 2 - 8, 2017
71. 18th International Conference on Light-Matter Coupling in Nanostructures (PLMCN18), Würzburg, Germany, 9th-14th of July, 2017 (**Plenary talk**)

72. 49th Conference of the European Group on Atomic Systems (EGAS), Durham, United Kingdom 17th to 21st July, 2017. (**Plenary talk**)
73. OECS Optics of Excitons in Confined System - Bath Sept. 2017
74. Symposium on Solid State Nano-Photonics for Quantum Science and Technology - Rank Prize Funds UK, 25-28 September 2017
75. WE-Heraeus Seminar - "International Workshop on Optical Microcavities and their Applications (WOMA)" Bad Honnef, Germany, November 13-17th 2017
76. Doctoral School on Nano and Quantum Optics, Les Houches, Novembre 2017 (**Lecturer**)
77. International Workshop on Recent advances in Quantum Computing, Saclay (13-14 December 2017)
78. Conference on Quantum Systems and Technology, Monte Verita (Switzerland). May 2018
79. International Workshop "The Single Photon World", Delft, 30th January 2018, Netherland, (**Lecturer**)
80. Zeiss Symposium, Oberkochen, Germany, April 2018
81. 15th international conference of Near-field Optics and Nanophotonics, NFO15, Troyes, France, August 2018
82. 18th Asian Quantum Information Science conference, Nagoya, Japan, 8-12 September 2018
83. Quantum Technology International Conference, Paris, September 5-7th, (**Plenary**)
84. 6th International Workshop on Engineering of Quantum Emitter Properties (EQEP), Rome, December 6-7th 2018
85. Quantum Information and Measurement conference, Rome 4-6th April 2019
86. Central European Workshop on Quantum Optics (CEWQO), Paderborn, Germany, June 3rd - 7th 2019
87. IEEE Summer meeting, Fort Lauderdale, USA, July 7-9th 2019
88. 2019 conference on Fundamental Optical Processes in Semiconductors (FOPS), Banff, Canada, August 04-09, 2019
89. Frontiers in Nanophotonics. Monteverita, Switzerland Sep.1 - 6 2019
90. Quantum Technologies and Quantum Information Science conference- European SPIE Security + Defence meeting -Strasbourg, France, 9-12 September 2019.
91. Frontiers in Optics 2019 + Laser Science (FiO/LS) Conference. 16-19 September 2019 Washington, DC, USA.
92. DPG Fall meeting, Freiburg, September 23-27 2019 (**Plenary**)
93. IQFA Annual Workshop of Quantum Information GDR, Paris, 13-15 November 2019
94. Micro- and Nanophotonics Days 2019, Palaiseau, 20-21 November 2019
95. Quantum and Neuromorphic, Palaiseau, November 25th 2019
96. EQEP workshop, Berlin, December 11-13th 2019
97. Quantum Dot Day, Oxford, January 6th, 2020
98. SPIE Photonics Europe, May 2020 - (**Plenary**)
99. Munich Conference on Quantum Science and Technology, July 6-8th 2020
100. QTech conference, Barcelona, Nov 2-4th 2020 (**Plenary**)
101. NOEKS, Munster, Sept. 2020
102. Quantum 2020, Oct 2020
103. Canada Quantum Day, January 13th, 2021
104. Portugal Quantum initiative, April 15th 2021
105. OECC2021 conference, July Ast 2021
106. IEEE Photonics for Quantum, July 12th 2021
107. WE-Heraeus-Seminar : Optical Information Processing, August 2021

108. Distinguished Lecturer - Public Lecture MCQST Munich November 2021
109. NWO conference - Netherland March 2022
110. Cours pour les professeurs d'écoles préparatoire - Avril 2022
111. Quantum energetics Grenoble - Juin 2022
112. ICPS, Sydney, June 2022 (**Plenary**)
113. QTD conference - June 2022
114. Lecture at High energy physics summer school July 2022
115. Journée de la Matière Condensée (JMC) Lyon - August 022 (**Plenary**)
116. Quantum 2.0 - US November 2022
117. Lectures at the NanoIQ summer school San Sebastien - Sept 2022
118. Conference In honour of the 2022 Nobel Prize - Saclay - Dec 2022
119. CLEO US San Jose - May 2023 - (**Tutorial**)
120. Quantum matter 2023 - Madrid, May 2023 - (**Keynote**)
121. OECS Lecce June 2023
122. Colloque en l'honneur d'Alain Aspect - Palaiseau - June 2023
123. Colloque en l'honneur de Claudine Herman - Palaiseau - June 2023
124. European Quantum Technology Conference - Hannover - Octobre 2023 - (**Keynote**)
125. QD2024 conference - Munich March 2024
126. Conference EGAS - Granada June 2024 (**Keynote**)
127. Conference Quantum 2.0 - Rotterdam June 2024
128. Conference Optique Normandie - July 2024 (**Plenary**)
129. Conference Photon 2024, Swansea, September 2024 (**Plenary**)
130. Eddleman Quantum Institute workshop, Balleroy September 2024
131. Quantum Photonics in the Spotlight, Paderborn, Oct 2024
132. 40 ans de boites quantiques, Palaiseau, January 2025
133. Quantum Optics and Quantum Materials, Lecce, May 2025
134. Quantum Matter 2025, Grenoble, May 2025 (**Keynote**)
135. 26th International Conference on Laser Spectroscopy (ICOLS2025), Elbe, June 2025 (**Plenary**)
136. Heraeus workshop on Progress in photonic quantum computing, Bad Honnef, Sept 2025
137. DPG Fall Meeting Goettingen : 100 Years of Quantum Mechanics, Göttingen, Sept 2025

Seminars and colloquia

138. LPCNO Toulouse, 7 février 2008
139. Bremen University, Germany, 4 fevrier 2010
140. Laboratoire de Photonique et de Nanostructures, France, 30 mars 2010
141. Laboratoire Pierre Aigrain, France, 12 avril 2010
142. laboratoire LPQM Cachan, France, 4 novembre 2010
143. CEA - SPEC, 26 novembre, France, 2010
144. laboratoire MPQ Paris, France, 2 décembre 2010
145. Walter Shottky Institute, Garching (Allemagne), 7 décembre 2010
146. Cavendish Laboratory, Cambridge (Royaume Uni), 6 mars 2011
147. University of Warsaw (Pologne) (28 Mai 2011)
148. University of Montpellier, France, 7 octobre 2011
149. Institut de Nanosciences de Paris, 3 novembre 2011

150. JQI, NIST, University of Maryland, USA, 2 avril 2012
151. QSIT Colloquium, ETH Zurich, 31 May 2012
152. Institut Langevin, Paris, 18 septembre 2012
153. Laboratoire Physique de la Matière Condensée, Palaiseau, mars 2013
154. University of Copenhagen, September 2013
155. University of Stuttgart, October 2013
156. University of Toronto, November 2013
157. Macquaries University, Sydney (Australia), April 2014
158. University of Queensland, Brisbane (Australia) , April 2014
159. Institut Néel, Grenoble 31 mars 2015
160. EPFL, Lausanne, juin 2015
161. Bonn University, October 2015
162. Troyes University, France, December 2015
163. Université de Villetaneuse, France, January 2016
164. Dresden University, March 2016
165. Leiden University, Physics Colloquium, June 2016
166. ENS Lyon, Nov 2016
167. Max Planck Institute for Quantum Optics, Garching, Colloquium, 17 mars 2017
168. General Physics Seminar - University Paris 7, June 2017
169. Seminar SPEC - CEA - Saclay , March 2018
170. Conference Grand Public IPR Rennes, March 2018
171. Collège de France seminar, May 2018
172. Rochester Lecture, Durham, UK, June 2018
173. Colloquium Chalmer, Sweden, December 2018
174. Seminar ENS Paris Saclay December 4th, 2018
175. Conference Grand Public, Lyon, Mars 2019
176. Ecole Polytechnique, Physics Department colloquium December 2019
177. SFP seminar, Toulouse, October 18th 2019
178. SFP Seminar Orsay, January 14th, 2020
179. IOGS, Students conference, Sept 2020
180. University of Illinois, Physics Colloquium Oct 14th 2020
181. ONERA, February 2nd, 2021
182. Colloquium University of Bristol, February 8th, 2021
183. Joint Quantum Institute Colloquium, Washington April 5th, 2021
184. IEMN seminar April 8th, 2021
185. Invited lecture - Munich Center for Quantum Science and Technology, April 20th, 2021
186. Specialized Seminar - Distinguished Lecturer - MCQST Munich Nov 2021
187. Colloquium de la Graduate School de Physique - Université Paris Saclay Dec 2021
188. University of Queensland - colloquium July 2022
189. University of Adelaïde Colloquium July 2022
190. ENS Paris Colloquium Feb. 2023
191. Exeter University colloquium March 2023
192. Colloquium à l'Académie de Pharmacie - Paris - November 2023
193. Colloquium à l'Académie de Chirurgie - Paris - December 2023

194. Conference de l'ANRT - Paris - November 2023
195. Colloquium au C2N - January 2024
196. Colloquium ENSSAT Rennes - January 2024
197. Conférence matinée quantique Bouygues - March 2024
198. Journée technologies quantiques Lannyon - April 2024
199. Colloquium Collège de France - May 2024
200. Journée Annuelle de la DAM, Saclay, Nov 2024
201. Séminaire MajuLab, Singapour, Feb 2025
202. Colloquium Center for quantum technologies, Singapour, Feb 2025

Referred journal publications

1. Nonlinear emission of microcavity polaritons in the low density regime, P. Senellart et J. Bloch, **Physical Review Letter** 82, 1233 (1999)
2. Stationary coherence in semiconductor microcavities, G. Cassabois, A. L. C. Triques, D. Larousse, C. Delalande, Ph. Roussignol, P. Senellart-Mardon, J. Bloch, V. Thierry-Mieg, and R. Planel, **Physical Review B**, 59, R10429 (1999)
3. Center-of-mass quantized exciton polariton states in bulk-GaAs microcavities, A. Fainstein, B. Jusserand, P. Senellart, J. Bloch, V. Thierry-Mieg, and R. Planel, **Physical Review B**, **62**, 8199 (2000)
4. Microcavity polariton depopulation as evidence for stimulated scattering, P. Senellart, J. Bloch, B. Sermage et J.Y. Marzin, **Physical Review B**, 62, R16263 (2000)
5. Evidence of non-linear emission of polaritons in a III-V microcavity, P. Senellart, J. Bloch, J.Y. Marzin, R. Planel, V. Thierry-Mieg, B. Jusserand, **Physica Status Solidi (a)**, 178, 167 (2000)
6. Time-resolved measurement of stimulated polariton relaxation, J. Bloch, B. Sermage, C. Jacquot, P. Senellart and V. Thierry-Mieg, **Phys. Stat. Sol. (a)** 190, 827 (2002).
7. Non-Linear spin-dependent polariton emission in semiconductor microcavities, P. Renucci, T. Amand, X. Marie, P. Senellart, J. Bloch, and B. Sermage, **Phys. Stat. Sol. (a)** 190, 407 (2002).
8. Phonon Sidebands in exciton and biexciton emission from single GaAs quantum dots, E. Peter, J. Hours, P. Senellart, A. Vasanelli, A. Cavanna, J. Bloch, J.M. Gerard, **Physical Review B**, 69, 041307 (R) (2004)
9. High-Q whispering-gallery mode in GaAs/AlOx microdisks, E. Peter, I. Sagnes, G. Guirleo, S. Varoutsis, J. Bloch, A. Lemaître, P. Senellart, **Appl. Phys. Lett.** 86, 021103 (2005)
10. Influence of an in-plane electric field on exciton fine structure in InAs/GaAs self-assembled quantum dots, K. Kowalik, O. Krebs, A. Lemaître, S. Laurent, P. Senellart, J. A. Gaj, P. Voisin, **Appl. Phys. Lett.** 86, 041907 (2005)
11. Exciton-Photon Strong-Coupling Regime for a Single Quantum Dot Embedded in a Microcavity, E. Peter, P. Senellart, D. Martrou, A. Lemaître, J. Hours, J. M. Gérard, J. Bloch, **Phys. Rev. Lett.** 95, 067401 (2005)
12. Exciton radiative lifetime controlled by the lateral confinement energy in a single quantum dot, J. Hours, P. Senellart, E. Peter, A. Cavanna, J. Bloch, **Phys. Rev. B** 71, 161306(R) (2005)
13. Monitoring the dynamics of a coherent cavity polariton population, J. Bloch, B. Sermage, M. Perrin, P. Senellart, R. André, D. Le Si Dang, **Phys. Rev. B** 71, 155311 (2005)
14. Few particle effects in the emission of short radiative lifetime single quantum dots, P. Senellart, E. Peter, J. Hours, A. Cavanna, J. Bloch, **Phys. Rev. B** 72, 115302 (2005)
15. Polariton relaxation in semiconductor microcavities : efficiency of electron-polariton scattering. M. Perrin, P. Senellart, A. Lemaître, J. Bloch. **Phys. Rev. B** 72, 075340 (2005)
16. Microcavity polariton spin quantum beats without a magnetic field : A manifestation of Coulomb exchange in dense and polarized polariton systems P. Renucci, T. Amand, X. Marie, P. Senellart, J. Bloch, B. Sermage, and K. V. Kavokin **Phys. Rev. B** 72, 075317 (2005)

17. Dynamics of microcavity polaritons in the presence of an electron gas D. Bajoni, M. Perrin, P. Senellart, A. Lemaître, B. Sermage, and J. Bloch. **Phys. Rev. B** 73, 205344 (2006)
18. Exciton dynamics in the presence of an electron gas in GaAs quantum wells, D. Bajoni, P. Senellart, M. Perrin, A. Lemaître, B. Sermage, J. Bloch. **Physica Status Solidi b**, 243, 2384 (2006).
19. Optical probing of spin-dependent interactions in II-VI semiconductor structures J. A. Gaj, J. Cibert, D. Ferrand, A. Golnik, M. Goryca, G. Karczewski, P. Kossacki, J. Kossut, K. Kowalik, O. Krebs, A. Kudelski, M. Kutrowski, A. Lemaître, W. Malana, M. Nawrocki, W. Pacuski, P. Pochocka, P. Senellart, S. Tatarenko, P. Voisin, T. Wojtowicz **Physica Status Solidi (b)** 243, 906-913 (2006).
20. Cavity QED with a single QD inside an optical microcavity E. Peter, J. Bloch, D. Martrou, A. Lemaître, J. Hours, G. Patriarche, A. Cavanna, J.M. Gérard, S. Laurent, I. Robert-Philip and P. Senellart **Phys. Stat. Sol. B**, 243, 3879 (2006)
21. Fast radiative quantum dots : From single to multiple photon emission E. Peter, S. Laurent, J. Bloch, J. Hours, S. Varoutsis, I. Robert-Philip, A. Beveratos, A. Lemaître, A. Cavanna, G. Patriarche, and P. Senellart **Appl. Phys. Lett.** 90, 223118 (2007)
22. Highly directional radiation pattern of microdisk cavities E. Peter, A. Dousse, P. Voisin, A. Lemaître, D. Martrou, A. Cavanna, J. Bloch, and P. Senellart **Appl. Phys. Lett.** 91, 151103 (2007)
23. Photon lasing in GaAs microcavity : Similarities with a polariton condensate Daniele Bajoni, Pascale Senellart, Aristide Lemaître, and Jacqueline Bloch **Phys. Rev. B** 76, 201305 (2007)
24. Polariton parametric luminescence in a single micropillar D. Bajoni, E. Peter, P. Senellart, J. L. Smirr, I. Sagnes, A. Lemaître, and J. Bloch **Appl. Phys. Lett.** 90, 051107 (2007)
25. Polariton laser using single micropillar GaAs-GaAlAs semiconductor cavities D. Bajoni, P. Senellart, E. Wertz, I. Sagnes, A. Miard, A. Lemaître and J. Bloch **Phys. Rev. Lett.** 100, 047401 (2008)
26. Microcavity polariton light emitting diode. Daniele Bajoni, Elizaveta Semenova, Aristide Lemaître, Sophie Bouchoule, Esther Wertz, Pascale Senellart, Jacqueline Bloch. **Phys. Rev. B** 77, 113303 (2008).
27. Controlled Light-Matter Coupling for a Single Quantum Dot Embedded in a Pillar Microcavity Using Far-Field Optical Lithography, A. Dousse, L. Lanco, J. Suffczynski, E. Semenova, A. Miard, A. Lemaître, I. Sagnes, C. Roblin, J. Bloch, P. Senellart **Phys. Rev. Lett.** 101, 267404 (2008), Research Highlight, Nature Materials 8, 86 (2009)
28. Optical bistability in a GaAs based polariton diode, Daniele Bajoni, Elizaveta Semenova, Aristide Lemaître, Sophie Bouchoule, Esther Wertz, Pascale Senellart, Sylvain Barbay, Robert Kuszelewicz, and Jacqueline Bloch, **Phys. Rev. Lett.** 101, 266402 (2008), News and Views, Nature Photonics 3, 135-136 (2009)
29. Suppression of nuclear spin diffusion at a GaAs/AlGaAs interface measured with a single quantum-dot nanoprobe, A.E. Nikolaenko, E.A. Chekhovich, M.N. Makhonin, I.W. Drouzas, A.B. Vankov, J. Skiba-Szymanska, M.S. Skolnick, P. Senellart, A. Lemaître, A.I. Tartakovskii. **Phys. Rev. B** 79, R081303 (2009)
30. Scalable implementation of strongly coupled cavity-quantum dot devices A. Dousse, J. Suffczynski, R. Braive, A. Miard, A. Lemaître, I. Sagnes, L. Lanco, J. Bloch, P. Voisin, and P. Senellart **Appl. Phys. Lett.** 94, 121102 (2009), **Research Highlight, Nature** 458, 682 (2009)
31. Continuous-wave versus time-resolved measurements of Purcell factors for quantum dots in semiconductor microcavities, M. Munsch, A. Mosset, A. Auffèves, S. Seidelin, J. P. Poizat, J.-M. Gérard, A. Lemaître, I. Sagnes, and P. Senellart, **Phys. Rev. B** 80, 115312 (2009)
32. Spontaneous formation of a polariton condensate in a planar GaAs microcavity, Esther Wertz, Lydie Ferrier, Dmitry D. Solnyshkov, Pascale Senellart, Daniele Bajoni, Audrey Miard, Aristide Lemaître, Guillaume Malpuech, and Jacqueline Bloch, **Appl. Phys. Lett.** 95, 051108 (2009)
33. Origin of the Optical Emission within the Cavity Mode of Coupled Quantum Dot-Cavity Systems ; J. Suffczynski, A. Dousse, K. Gauthron, A. Lemaître, I. Sagnes, L. Lanco, J. Bloch, P. Voisin, and P. Senellart, **Phys. Rev. Lett.** 103, 027401 (2009)
34. Spontaneous nonground state polariton condensation in pillar microcavities, Maragkou M, Grundy AJD, Wertz E, Lemaître A, Sagnes I, Senellart P, Bloch J, Lagoudakis PG, **Phys. Rev. B**, 81, 081307 (2010)

35. Ultrabright source of entangled photon pairs, A. Dousse, J. Suffczynski, A. Beveratos, , A. Lemaître, I. Sagnes, J. Bloch, P. Voisin, and P. Senellart. **Nature** 466, 217 (2010).
36. Spontaneous formation and optical manipulation of extended polariton condensates, E. Wertz, L. Ferrier, D. Solnyshkov, R. Johne, D. Sanvitto, A. Lemaître, I. Sagnes, R. Grousson, A.V. Kavokin, P. Senellart1 G. Malpuech and J. Bloch, **Nature Physics**, 6, 860 (2010)
37. A quantum dot based bright source of entangled photon pairs operating at 53 K. A. Dousse, J. Suffczynski, O. Krebs, A. Beveratos, A. Lemaître, I. Sagnes, J. Bloch, P. Voisin, and P. Senellart. **Appl. Phys. Lett.** 97, 081104 (2010)
38. Optically tunable nuclear magnetic resonance in a single quantum dot M. N. Makhonin, E. A. Chekhovich, P. Senellart, A. Lemaître, M. S. Skolnick, and A. I. Tartakovskii **Phys. Rev. B** 82, 161309 (2010)
39. Quantum dot-cavity strong-coupling regime measured through coherent reflection spectroscopy in a very high-Q micropillar, Vivien Loo, Loïc Lanco, Aristide Lemaître, Isabelle Sagnes, Olivier Krebs, Paul Voisin, and Pascale Senellart, **Appl. Phys. Lett.** 97, 241110 (2010)
40. High frequency GaAs nano-optomechanical disk resonator, High frequency GaAs nano-optomechanical disk resonator. Lu Ding, Christophe Baker, Pascale Senellart, Aristide Lemaître, Sara Ducci, Giuseppe Leo, Ivan Favero, **Phys. Rev. Lett.** 105, 263903 (2010)
41. Single-shot initialization of electron spin in a quantum dot using a short optical pulse. Vivien Loo, Loïc Lanco, Olivier Krebs, Pascale Senellart, Paul Voisin, **Phys. Rev. B.** 83, 033301 (2011)
42. Interactions in Confined Polariton Condensates Lydie Ferrier, Esther Wertz, Robert Johne, Dmitry D. Solnyshkov, Pascale Senellart, Isabelle Sagnes, Aristide Lemaître, Guillaume Malpuech, and Jacqueline Bloch **Phys. Rev. Lett.** 106, 126401 (2011)
43. Wavelength-sized GaAs optomechanical resonators with gigahertz frequency L. Ding, C. Baker, P.Senellart, A. Lemaître, S. Ducci, G. Leo, and I. Favero **Appl. Phys. Lett.** 98, 113108 (2011)
44. Spatial, spectral and polarization properties of coupled micropillar cavities S. Michaelis de Vasconcellos, A. Calvar, A. Dousse, J. Suffczynski, N. Dupuis, A. Lemaître, I. Sagnes, J. Bloch, P. Voisin and P. Senellart, **Appl. Phys. Lett.** 99, 101103 (2011)
45. Evidence for Confined Tamm Plasmon Modes under Metallic Microdisks and Application to the Control of Spontaneous Optical Emission O. Gazzano, S. Michaelis de Vasconcellos, K. Gauthron, C. Symonds, J. Bloch, P. Voisin, J. Bellessa, A. Lemaître, P. Senellart, **Phys. Rev. Lett.** 107, 247402 (2011)
46. Full coherent control of nuclear spins in an optically pumped single quantum dot M. N. Makhonin, K. V. Kavokin, P. Senellart, A. Lemaître, A. J. Ramsay, M. S. Skolnick, A. I. Tartakovskii, **Nature Materials** 10, 844-848 (2011)
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